

# The Effects of Data Storage Paradigms on Custom Order Processing

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# Objectives

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- ◆ **Address EOSDIS risks related to user expectations of individualized user support.**
- ◆ **Investigate the impact of data storage decisions on custom order processing using a multi-layered database approach**
- ◆ **Compare possible increased resource requirements for custom order processing vs. decreased data delivery costs**

# Approach

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- ◆ **Investigation of data storage paradigms, data file organization and metadata models**
- ◆ **Provide access to data at granule, sub-granule, and super-granule level as needed**
- ◆ **Provide mechanism for user to tailor data request**
  - access only those objects or sub-objects needed by the user
  - package them in reasonably sized files, as defined by the user

# Implementation Plan

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- ◆ **Prototype various methods of data organization with each of several EOSDIS precursor datasets**
- ◆ **Test each data/metadata model against one or more custom order processing scenarios (including temporal, geographic and parameter subsetting in scenarios for specific datasets)**
- ◆ **For each test, monitor resources required, including**
  - CPU
  - archive access
  - data volume delivered
  - order processing manpower
  - staging storage

# Current Status

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- ◆ **Awaiting funding**

# Next Steps

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- ◆ **Begin research**

# ESDIS Support Desired

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- ◆ Assistance with identification of custom order scenarios
- ◆ Assistance with identification of sample datasets, as needed
- ◆ Identification of appropriate involvement in telecons, meetings, special interest groups, and other situations